

REMARKS

Summary of the Office Action

Claims 1-11 and 36-41 are pending.

Claims 1-5, 9, 10, and 36-39 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Sitnik U.S. Patent No. 6,160,570 (hereinafter "Sitnik") in view of Alexander *et al.* U.S. Patent No. 6,177,931 (hereinafter "Alexander") and Wachob U.S. Patent No. 5,155,591 (hereinafter "Wachob").

Claims 6 and 7 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Sitnik, Alexander, and Wachob in view of Herz *et al.* U.S. Patent No. 6,020,883 (hereinafter "Herz") and Ivanyi U.S. Patent No. 6,286,140 (hereinafter "Ivanyi").

Claims 8, 11, 40 and 41 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Sitnik in view of Alexander, Wachob and Herz.

These rejections are respectfully traversed.

Summary of Applicants' Reply

Applicants have cancelled claims 1-7, 10, 36 and 37. Claim 11 has been amended to be rewritten in independent form. Applicants have also added new claims 42-82. (These Remarks are followed by an Appendix showing

how these claims have been amended.) Claims 8, 9 and 38-41 are also in this case. No new matter has been added as a result of these amendments. The Examiner's rejections are respectfully traversed.

Applicants' Reply To The
Rejection of Claim 8

The Examiner rejected claim 8 under 35 U.S.C. § 103(a) as being unpatentable over Sitnik, Alexander, and Wachob in view of Herz. This rejection is respectfully traversed.

Applicants' independent claim 8 is directed to a method of demographically-targeting advertising to a given user of an interactive television program guide. User values for demographic categories (e.g., gender, income, interests, etc.) are determined utilizing the user input (e.g., setting a reminder for a program, recording a program, watching a program, etc.) received from the user interface. Because different types of user inputs may have different effects on the user's demographic values, weight values are applied to the user inputs in a manner that are indicative of the effect the user input has on the user values for the demographic categories (e.g., FIG. 3 and applicants' specification, page 13). The user's

demographic values are stored and compared to corresponding demographic data associated with the advertisements. This comparison determines which demographically-targeted advertisements are displayed for the user in the interactive program guide.

As illustrated in FIG. 3 and described on page 13 of applicants' specification, different user inputs (e.g., watching a program, recording a program, retrieving information about a program, setting a reminder for a program, etc.) may be applied with different weight values, thereby indicating different effects on the user's demographic values. For example, "a user who records a program will have greater [weight] values for the pertinent demographic categories than she will retrieving information about the same program. This is because the act of recording a program generally indicates a greater level of interest in the program than just retrieving information for the program" (Applicants' Specification, page 13, lines 25-30).

However, in the Office Action, while the Examiner acknowledges the novelty of applicants' approach over Sitnik, Alexander, and Wachob, the Examiner contends that

"the limitation of weight values to the user input" as defined in applicants' claim 8 is shown in Herz because Herz discloses "a weight value . . . that further defines the user values" (December 19, 2002 Office Action, pages 5-6).

Applicants respectfully submit that Herz does not disclose the "weight value" feature of claim 8. Therefore, the cited references do not teach or suggest all of applicants' claimed features as is required to establish a *prima facie* case of obviousness.

Herz discloses a "system for aiding a customer in the selection of video programming for viewing by matching the available video programming to each customer's objective preferences. Accordingly, the content and customer profiles will include characteristics which are useful in defining the characteristics of video programming" (Herz at column 9, line 64 to column 10, line 2). In this context, the "weights" of Herz are used to "illustrate the importance of [the] characteristic to [the] customer" (Herz at column 11, lines 16-17). That is, Herz only discloses the concept of "weights" for reflecting a characteristic's importance to the customer when making comparisons between "content profiles" and "customer profiles". However, Herz neither suggests nor teaches that

"weights" may be applied to "user inputs" when determining user values for demographic categories in a manner that is indicative of the user input's effect on the user values for the demographic categories.

In contrast, the weight values of applicants' claim 8 are required for "determining user values for demographic categories utilizing said user input," such that weight values are "indicative of [the user input's] effect . . . on the user values for the demographic categories," as defined in independent claim 8. Herz has only disclosed "weights" in the context of comparing the customer's profile with program characteristics, but not for determining user values for demographic categories. Moreover, applicants' weight values are indicative of the user input's effect on the user values for demographic categories, while Herz's "weights" reflect the importance of the characteristic to the customer. Therefore, Herz provides no teaching or suggestion that its "weights" may be used to modify user inputs when determining the user's demographic values.

Accordingly, applicants respectfully submit that neither Herz, the other references, nor any combination teach or suggest the "weight values" as defined by independent claim 8. Therefore, for at least the reasons

stated above, applicants' invention cannot be rendered obvious by the combination of Sitnik, Alexander, Wachob, and Herz. The Examiner's rejection of claim 8 should therefore be withdrawn.

Applicants' Response To The
Rejection of Claims 11 and 41

The Examiner rejected claims 11 and 41 under 35 U.S.C. § 103(a) as being unpatentable over Sitnik, Alexander, and Wachob in view of Herz. The Examiner's rejection is respectfully traversed.

Claim 11 has been rewritten herein in independent form.

As set forth in independent claims 11 and 41, applicants' invention is directed towards a method of demographically-targeting advertising to a given user of an interactive television program guide. User demographic information (claim 11) or user values for demographic categories (claim 41) (e.g., gender, income, interests, etc.) are stored and compared to corresponding demographic data associated with advertisements. A decay function or procedure is used to refresh the user demographic information (claim 11) or user values (claim 41).

Applicants' specification at pages 16-17 makes clear that the decay procedure required in claims 11 and 41

refreshes the user's demographic values after a predetermined period of time or after a specified number of user inputs. After this decay procedure or function, the user's demographic values are refreshed by determining user values based on more recent and current user inputs (claim 41) or by gathering and storing more recent and current user demographic information (claim 11).

In the Office Action, the Examiner correctly acknowledges the novelty of applicants' approach over Sitnik, Alexander, and Wachob. However, the Examiner contends that the "decay procedure to refresh user values" (December 12, 2002 Office Action, page 6) is shown in Herz. Applicants respectfully disagree that this feature is taught or suggested by Herz.

Herz states that to "ensure accuracy of the profiles, there must be some way to correct errors . . . and to adjust the customer profiles over time" (Herz, column 14, lines 1-3). To accomplish this goal, Herz discloses that a customer may provide his or her "most preferred level for the characteristic given the assigned characteristic level" or the customer may instead "strongly disagree with the assigned characteristic level" (Herz, column 14, lines 22-24 and 27-28). However, instead of refreshing the prior customer profile, Herz states that

"[i]n order to avoid dramatic changes in the value, the setting of the new values should take into consideration both the old and the new data" (Herz, column 14, lines 56-58) and "[a]ny dramatic changes will be damped down, especially at later iterations" such that the "customer's profile should stabilize over time" (Herz, column 15, lines 6-9) (emphasis added). That is, Herz discloses a procedure in which the customer's profile is continuously averaged, thereby dampening down the dramatic changes and stabilizing the customer's profile over time. In stark contrast, applicants' independent claims 11 and 41 does not have a dampening or stabilizing procedure, but rather a decay procedure or function by which the user demographic values (claim 41) or user demographic information (claim 11) are refreshed at intervals of time or after a number of user inputs. The refreshing of the user values or user information results from determining user values for demographic categories based on user inputs after the decay procedure (claim 41) or by gathering and storing user demographic information after the decay function (claim 11).

Because this feature is neither taught nor suggested by Herz or the other references, applicants respectfully submit that Herz does not disclose the decay

functionality required in claims 11 and 41. Therefore, the cited references do not teach or suggest all of applicants' claimed features as is required to establish a *prima facie* case of obviousness. Applicants respectfully submit that claims 11 and 41 are therefore allowable over the combination of Sitnik, Alexander, Wachob, and Herz.

Claim 9, 38, and 39 are dependent from claim 11 and are allowable at least because claim 11 is allowable.

Applicants' Response To The
Rejection of The Claim 40

The Examiner rejected claim 40 under 35 U.S.C. § 103(a) as being unpatentable over Sitnik, Alexander, and Wachob in view of Herz. The Examiner's rejection is respectfully traversed.

Applicants' independent claim 40 is directed towards a method of demographically-targeting advertising to a user of an interactive program guide. User input is received from the user interface, wherein examples of user inputs include setting a reminder for a program, recording a program, watching a program, etc. By utilizing this user input, user values for demographic categories (e.g., gender, income, interests, etc.) are determined. A separate period is used for each demographic category,

wherein the period for each category is representative of how much user input is needed before the user value for that category is deemed to be reflective of the given user.

As stated in applicants' specification at page 14, lines 25-30, the period of claim 40 establishes a statistical threshold by requiring a minimum number of user inputs when determining the user's demographic values for each category. With this user input threshold, the values determined for each category from user inputs thus may be more meaningful and reflective of the user.

In the Office Action, the Examiner correctly acknowledges the novelty of applicants' approach over Sitnik, Alexander, and Wachob. However, the Examiner contends that "using a separate period for each demographic category, wherein the period for each category is representative of how much user input is needed before the user value for that category is deemed to be reflective of the given user" as defined in independent claim 40 is shown in Herz. Applicants respectfully disagree that this feature is taught or suggested by Herz.

In the Office Action, the Examiner contends that "Herz teaches predicting a program and if the user watches the program then the profile is valid . . . which reads on how much user input is needed before the user value for

that category is reflective on the given user" (December 19, 2002 Office Action, page 6). However, the cited portion of Herz actually discloses a method for "updating" "the initial customer profiles" by "determin[ing] which video programs the customer might desire to view", and then "determin[ing] if the customer actually watched the video program selected" (Herz at column 26, lines 51-59). That is, Herz attempts to validate its initial customer profile by subsequent testing of its predictive accuracy.

In contrast, applicants' specification at page 14 makes clear that the period feature of claim 40 is used when determining the user values from user inputs. Verifying whether the customer actually watched the video program selected is not setting a "period for each demographic category, wherein the period for each category is representative of how much user input is needed before the user value for that category is deemed to be reflective of the given user," as defined in independent claim 40.

Because the period feature is neither taught nor suggested by Herz, applicants respectfully submit that Herz does not disclose the period feature of claim 40. Therefore, the cited references do not teach or suggest all of applicants' claimed features as is required to establish a *prima facie* case of obviousness. Applicants respectfully

submit that claim 40 is therefore allowable over the combination of Sitnik, Alexander, Wachob, and Herz.

Newly Added Claims

New claims 42-46 depend from claim 8, and therefore are allowable for at least the same reasons that claim 8 is allowable.

New claims 47-64 correspond to claims 8 and 42-46, and therefore are allowable for at least the same reasons that claims 8 and 42-46 are allowable.

New claims 65-76 correspond to claims 9, 11, 38 and 39, and therefore are allowable for at least the same reasons that claims 9, 11, 38 and 39 are allowable.

New claims 77-79 correspond to claim 40 and therefore are allowable for at least the same reasons that claim 40 is allowable.

New claims 80-82 correspond to claim 41 and therefore are allowable for at least the same reasons that claim 41 is allowable.

Conclusion

The foregoing demonstrates that claims 8, 9, 11 and 38-82 are allowable. Reconsideration and allowance of the application are respectfully requested.

Respectfully submitted,

A handwritten signature in dark ink, appearing to read "Philip R. Poh", is written over a horizontal line.

Philip R. Poh
Registration No. 51,176
Agent for Applicants
FISH & NEAVE
1251 Avenue of the Americas
New York, New York 10020-1104
Tel.: (212) 596-9000



UV-58 CPA

APPENDIX TO REPLY TO DECEMBER 19, 2002 OFFICE ACTION

This appendix presents the amendments that have been made in bracket-and-underline format.

Claims 1-7, 10, 36 and 37 have been cancelled.

Claims 42-82 have been added.

Claims 9, 11, and 38 has been amended as follows:

9. (Twice amended) The method of claim [5]11, wherein the user demographic information for the given user comprises demographic categories, and wherein the method further comprises providing default values for the demographic categories of the user demographic information for the given user.

11. (Twice amended) [The method of claim 5, which further comprises] A method for demographically-targeting advertisements to a given user of an interactive television program guide, comprising:

receiving advertisements for the interactive television program guide, the advertisements having associated demographic category data;

gathering user demographic information for the given user using a survey;

storing the user demographic information for the given user;

performing a decay procedure to refresh the stored user demographic information;

comparing the demographic category data associated with the advertisements with the stored user

demographic information for the given user to determine which advertisements should be displayed by the interactive television program guide for the given user; and
displaying demographically-targeted advertisements for the given user in the interactive television program guide based on the comparison.

38. (Amended) The method of claim [5]11, wherein the user demographic information includes demographic information selected from the group consisting of: income information and gender information, and wherein the method further comprises comparing the demographic category data with the user demographic information that includes the demographic information selected from the group consisting of: income information and gender information.